

Crown Cleaners of Watertown, Inc. Superfund Site



SUPERFUND RESPONSE ACTION PRIORITY PANEL REVIEW

2012



Site History

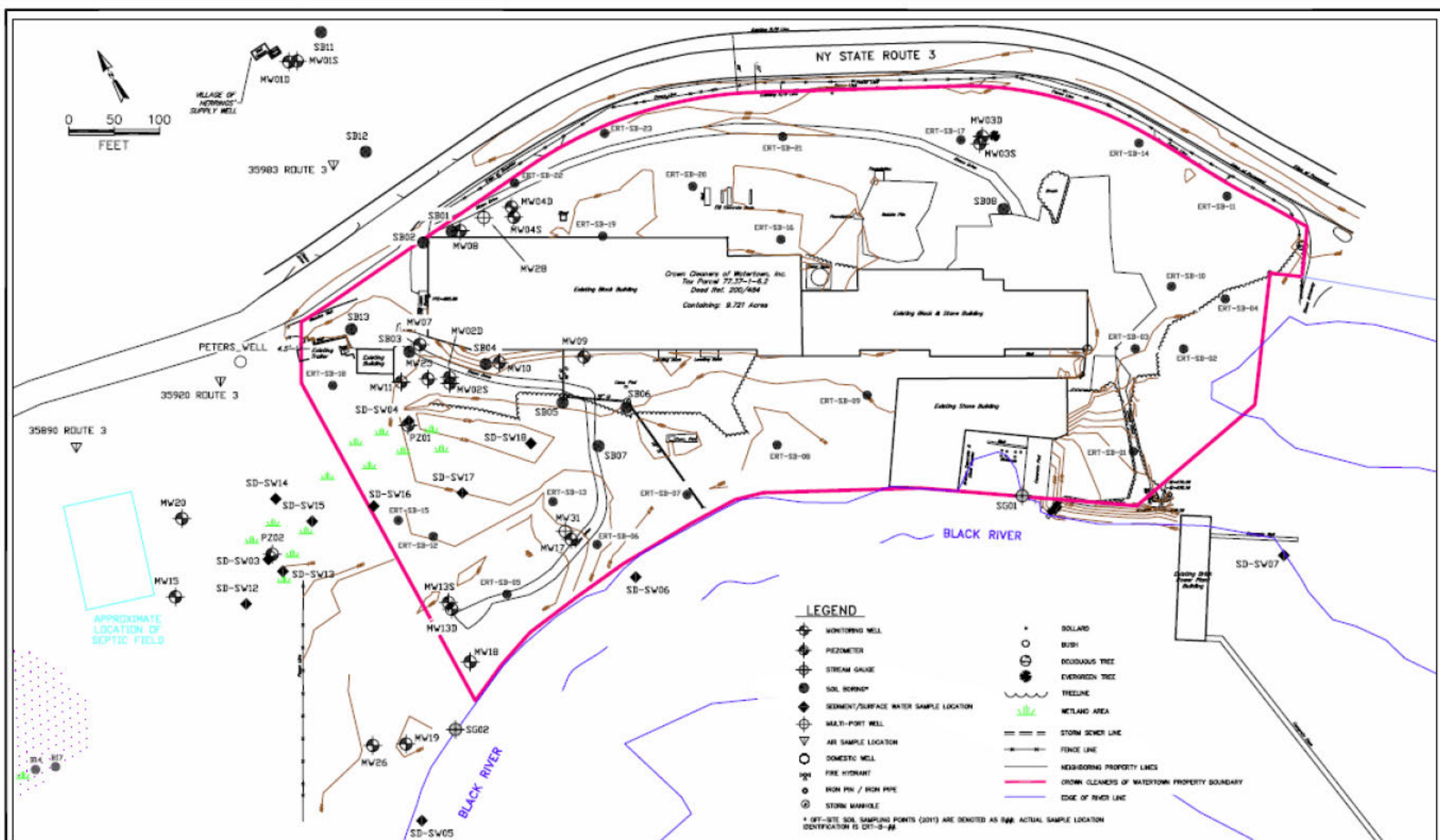




Site Background

- St. Regis Paper Company used the site to produce paper bags and related products from 1890 until the mid-1960's.
- Property purchased by Crown Cleaners of Watertown, Inc. in the late 1970s.
- Operated until 1991 as a dry cleaning and laundry facility.
- Primary contaminants of concern are PCE and TCE.
 - PAHs, metals, PCBs, and pesticides also detected in samples.





TETRA TECH EC, INC.

TITLE:
SITE MAP – EASTERN PORTION
 Remedial Investigation Report
 Crown Cleaners of Watertown, Inc.

DWN:	LMB	DATE:	09/12/11	PROJECT NO.:	106-3810.0008
CHKD:		REV.:	2	FIGURE NO.:	1-3
DES:	LEA	APPD:			



Crown Cleaners dilapidated building



Western Wetlands area





Nature and Extent - Soil

- PCE present in site soils at levels above criteria.
- Highest concentrations of PCE generally present near the western end of the main building.
 - Former filter storage area/rubble pile, solvent delivery/storage/usage area likely sources.
- Lead, pesticides, and PAHs also detected in soil on Crown Cleaners property.



Nature and Extent - Groundwater

- PCE contamination extends through the upper unit bedrock aquifer on-site to the west.
 - Highest concentrations of PCE generally present near western end of main building.
 - Additional area of PCE-impacted groundwater in western wetlands area.
 - Limited natural attenuation.
 - Some degradation and dispersion.



Nature and Extent – Surface water and Sediment

- No significant impacts to Black River.
- PCE present in surface water and sediment in wetlands areas.
- PAHs, pesticides and PCBs in sediment in western wetlands area.



Human Health Risk Assessment

- No significant vapor intrusion risks.
- Potential risk from PAHs in western wetlands area.
- Risk to potential future residents at Crown Cleaners property if site developed.
- Groundwater at the site poses risk for drinking.



Ecological Risk Assessment

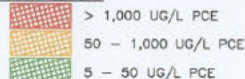
- Low potential risks to terrestrial mammals in upland and wetland habitats.
- Limited risks to terrestrial and wetland plants and invertebrates from metals and PAHs in wetland soils.
- A potential significant risk for avian receptors from lead in both upland soils and wetland soils/sediments.
- A potential risk to benthic community structure and function from PAHs, chlorodane and multiple metals in wetland sediments.



Site Remedy

- Alternatives S-3 and GW-3
 - Building Demolition, Excavation of PCE- and PAH-contaminated soils and limited excavation of wetland sediments.
 - Source Area In-Situ Chemical Oxidation.
 - Monitored Natural Attenuation.
 - Long-Term Monitoring.

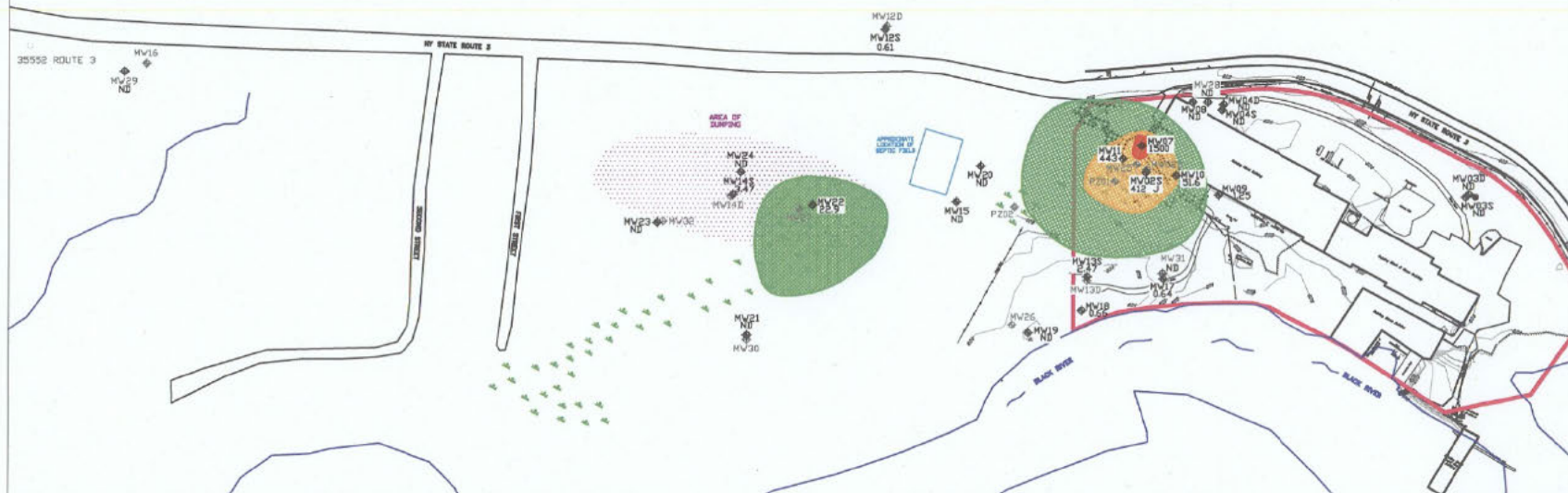
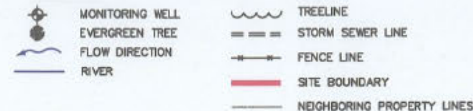
CONTOUR LEGEND



- NOTES:
- 1) CONCENTRATIONS ARE PROVIDED IN UG/L.
 - 2) CONCENTRATIONS ARE THE MAXIMUM VALUE DETECTED IN THE WELL (REGARDLESS OF SAMPLING METHODOLOGY) COLLECTED WITHIN THE UPPER CARBONATE HYDROSTRATIGRAPHIC UNIT DURING THE 2011 FIELD INVESTIGATION.
 - 3) NON-DETECTS ARE POSTED AS "ND" AND ARE CONTOURED AS 1/2 THE DETECTION LIMIT.
 - 4) THE MAXIMUM CONTAMINANT LEVEL (MCL) FOR PCE IN GROUNDWATER IS 5 UG/L.
 - 5) ISOCONCENTRATION CONTOURS ARE BASED ONLY ON THE AVAILABLE UPPER CARBONATE HYDROSTRATIGRAPHIC UNIT BEDROCK GROUNDWATER DATA. THE CONTOUR LIMITS ARE ESTIMATES (ESPECIALLY LIMITS DENOTED BY DASHED LINES), AND THE PLUME MAY EXTEND BEYOND THESE BOUNDARIES.
 - 6) WELLS IN GRAY DID NOT HAVE SAMPLES COLLECTED WITHIN THE UPPER CARBONATE HYDROSTRATIGRAPHIC UNIT.



LEGEND



TETRA TECH EC, INC.

TITLE:
ISOCONCENTRATION CONTOUR EXTENT OF PCE IN UPPER UNIT GROUNDWATER - 2011
Remedial Investigation Report
Crown Cleaners of Watertown, Inc.

OWN.: LEA	DATE: 08/10/11	PROJECT NO.: 106-3810.0008
CHKD.:	REV.: 1	FIGURE N° 3
DES.: LEA	APPD.:	



Cost

- Estimated Cost of Proposed Remedy:
 - Soil and Sediment Remediation - \$4,253,000.
 - Groundwater Treatment: \$1,976,000.
 - OM&M (1st year): \$505,000 (includes injections).
 - Annual OM&M: \$57,000.



Crown Cleaners of Watertown, Inc. Fencing looking south from Rte. 3

